Saint Herman Subdivision
Appendix 3
Environmental Assessment

Section 1 - Resource Assessment and Impact Criteria Report

a) Surface Water:

i. Locate on the preliminary plat and describe all surface water and the delineated 100 year floodplain(s) which may affect or be affected by the proposed subdivision including:

(a) All natural water systems such as perennial and intermittent streams, lakes and ponds, rivers, or marshes;

A seasonal pond is located in the Northeast corner of the property. The location of the seasonal pond is shown on the Preliminary Plat. A proposed "No Build Zone" is shown on the preliminary plat that encompasses the seasonal pond. There are no streams, rivers, marshes or 100 year floodplain areas on the property.

(b) All artificial water systems such as canals, ditches, aqueducts, reservoirs, irrigation or drainage systems;

There are roadside ditches along Morning View Drive and North Hill Road for storm water. Besides these features, there are no other artificial water systems on the property. See Appendix 21 for a Water Resource Survey Map.

ii. Describe all probable impacts to surface waters which may affect or be affected by the proposed subdivision including name, approximate size, present use, and time of year when water is present and proximity of proposed construction (e.g. buildings, sewer systems, roads) to surface waters;

No impacts to surface water are anticipated. There is no proposed construction near surface water.

Storm water retention basins are shown on the preliminary plat. These basins will collect excess run off from the development, not allowing the excess storm water to run off site, or into an area with surface waters.

Calculations in Appendix 12, Non-Degradation Analysis, show that surface waters down gradient of the proposed wastewater system for the church will not be adversely affected from the wastewater system.

iii. Describe any existing or proposed stream bank or shoreline alterations or any proposed construction or modification of lake beds or stream channels. Provide information on location, extent, and purpose of alteration. If any construction or

changes are proposed which require a 310 Permit from the Flathead County Conservation District the subdivider shall acknowledge that the permit is required and will be obtained prior to final plat;

As shown on the preliminary plat, there is no proposed construction near surface water. A no build zone has been placed on the preliminary plat in the area where a seasonal pond is located.

iv. If wetlands are present, the subdivider shall identify and provide a map showing wetland areas. A wetlands investigation completed by a qualified consultant, using the most current U.S. Army Corps of Engineers' Wetlands Delineation Manual may be required. If any construction or changes are proposed which require a 404 Permit, the subdivider shall acknowledge that the permit is required and will be obtained.

The National Wetlands Inventory Mapper identifies one wetland area on the property. See Appendix 27 for a map from the National Wetlands Inventory. The wetland area is shown on the preliminary plat in Northeast corner of the property. This wetland area is well confined. It is obvious that there are no other wetlands on this site. Therefore, a no build zone is proposed that encompasses the seasonal pond and wetland region.

b) Ground Water:

i. Establish the seasonal minimum and maximum depth to water table, dates on which these depths were determined, and the location and depth of all known aquifers which may be affected by the proposed subdivision. Monitoring may be waived if evidence of minimum and maximum ground water elevations can be documented;

Six test pits were dug on the proposed church lot, near the proposed drainfield on April 8, 2019. Two of the test pits had ground water in them and the other four test pits did not have groundwater. Monitoring wells were placed in each test pit. An intent to monitor ground form was submitted to Flathead County. Groundwater will be monitored until June 30th, or until a peak ground water elevation is established. A copy of the groundwater monitoring form, map and groundwater measurements from April 8th, are located in Appendix 26. The monitoring well locations are shown on the preliminary plat.

ii. If determined from subsection (b)(i) above that any area within the proposed subdivision is within four feet of the surface, the high water table shall be measured from tests taken during the period of the highest groundwater elevations, generally from March 15 through June 30, during average precipitation years and reported in the environmental assessment;

Six test pits were dug on the proposed church lot, near the proposed drainfield on April 8, 2019. Two of the test pits had ground water in them and

the other four test pits did not have groundwater. A monitoring well was placed in each test pit. An intent to monitor ground form was submitted to Flathead County. Groundwater will be monitored until June 30th, or until a peak ground water elevation is established. A copy of the groundwater monitoring form, map and groundwater measurements from April 8th, are located in Appendix 26. The monitoring well locations are shown on the preliminary plat.

iii. Describe any steps necessary to avoid probable impacts and the degradation of ground water and ground water recharge areas as result of the subdivision.

A non-degradation analysis has been performed for the proposed wastewater system and is included in Appendix 12. This analysis shows that the proposed wastewater system will be in compliance with MDEQ requirements for non-degradation.

c) Geology/Soils:

i. Locate on the preliminary plat any known geologic hazards affecting the subdivision which could result in property damage or personal injury due to rock falls or slides, mud, snow; surface subsidence (e.g., settling or sinking); and seismic activity;

The land within the subdivision is gently sloped. As shown on the preliminary plat, slopes on the site are less than 40%. Ground slopes on Lot 2, the church lot, range from 1%-8%. Based on a site visit, land slopes and aerial photography (See Appendix 20), there is no evidence of rock falls, mud or snow slides or subsurface subsidence. Geologic maps are included in Appendix 17. Also included in Appendix 17 is a map from the Flathead County GIS Mapper showing fault lines. Based on this map, there are no fault lines running through the project.

ii. Explain what measures will be taken to prevent or materially lessen the danger and probable impacts of future property damage or personal injury due to any of the hazards referred to above;

No preventative measures are necessary as no geologic hazards have been identified.

iii. Explain any unusual soil, topographic or geologic conditions on the property which limit the capability for building or excavation using ordinary and reasonable construction techniques. The explanation should address conditions such as shallow bedrock, high water table, unstable or expansive soil conditions, and slope. On the preliminary plat identify any slopes in excess of 40 percent;

The land within the subdivision is gently sloped. As shown on the preliminary plat, slopes on the site are less than 40%. Ground slopes on Lot 2, the church lot, range from 1%-8%.

Six test pits were dug on the proposed church lot, near the proposed drainfield, on April 8, 2019. Two of the test pits had ground water in them and the other four test pits did not have groundwater. A monitoring well was placed in each test pit. An intent to monitor ground form was submitted to Flathead County. Groundwater will be monitored until June 30th, or until a peak ground water elevation is established. A copy of the groundwater monitoring form, map and groundwater measurements from April 8th, are located in Appendix 26. The monitoring well locations are shown on the preliminary plat.

Test pits logs are located in Appendix 9. Test pits generally had topsoil (loam) to a depth of 10"-12", gravelly sandy silt loam from 10"+/- to 60"+/- and gravelly silt loam from 60"+/- to 96". These soils types will not constrain or limit drainfield design, building design or construction activity.

iv. Identify any soils constraints, including probable impacts due to expansive soils, hydric soils, or any soils which limit sanitary facilities. Explain special design considerations and methods needed to overcome the soil limitations;

As described above, the soil type from a depth of 10"+/- to 60"+/- is a gravelly, sandy, silt loam. An application rate of 0.3 gallons of effluent per square foot will be used to design the drainfield for the church lot. Based on this application rate, there is plenty of room for the drainfield on the church lot.

High groundwater will be monitored through the wet season to ensure that there is a minimum of four feet of separation between the bottom of the drainfield and the established high groundwater mark. Four of the six test pits were at a higher elevation on the lot and did not have groundwater in them.

v. Describe the location and amount of any cut or fill three or more feet in depth. These cuts and fills should be indicated on a plat overlay or sketch map. Where cuts or fills are necessary, describe any plans to prevent erosion and to promote re-vegetation such as replacement of topsoil and grading.

As shown on the preliminary plat, there are no proposed public roads and therefore no significant cuts or fills. The proposed buildings, parking lot and driveway on the church lot are located on land with gentle slopes. Therefore, there are no anticipated cuts or fills of three feet or more.

d) Vegetation:

i. On a sketch map or aerial photo indicate the distribution of the major vegetation types such as marsh, grassland, shrub, coniferous forest, deciduous forest, mixed forest, including critical plant communities such as stream bank or shore line vegetation; vegetation on steep, unstable slopes; vegetation on soils highly susceptible to wind or water erosion;

As shown on the preliminary plat, located in Section 3, and historical air photo's, located in Appendix 20, the land within the subdivision is primarily grassland with a few scattered trees. There is one wetland region in the Northeast portion of the property. The extent of this wetland is well defined. The proposed church lot includes only grassland.

ii. Identify any locations of noxious weeds and identify the species of weeds and explain measures to control weed invasion;

Appendix 18 contains a Flathead County Weed Management Plan and a map showing the location and type of weeds on the property.

iii. Describe any probable impacts and any protective measures to preserve trees and critical plant communities (e.g., design and location of roads, lots and open spaces).

A "no build zone" is shown on the preliminary plat that covers the wetland region in the Northeast portion of the property.

e) Wildlife:

i. Describe species of fish and wildlife which use the area affected by the proposed subdivision;

According to the current residents of the land, Father Daniel Kirk and his family, deer and songbirds are common in the area. There are occasionally signs of moose or bear in the area, but are not commonly seen.

An "Animal Species of Concern" report was generated for the "Blue Grass Ridge" Quadrangle region (includes the area of the project site) from the Montana National Heritage website (mtnhp.org/SpeciesOfConcern/). A copy of this report is located in Appendix 28. This report lists bats, weasels, herons, bitterns, gulls, jays, crows, magpies, grebes, true toads, trout and other species as being "species of concern" for the region. The habitats listed for these species inculdes riparian, forest, mixed conifer forests, riparian forest, wetlands, floodplain pools, mountain streams, rivers, and lakes.

Montana, Fish, Wildlife and Parks was contacted regarding the subdivision. They replied with a letter stating that they had no comment on the subdivision. A copy of their letter is in Appendix 22.

ii. Identify on the preliminary plat any known critical or "key" wildlife areas, such as big game winter range, waterfowl nesting areas, habitat for rare or endangered species, or wetlands;

The National Wetlands Inventory Mapper identifies one wetland area on the property. This is shown on the preliminary plat in Northeast corner of the property. This wetland area is well confined. It is obvious that there are no

other wetlands on this site. Therefore, a no build zone is proposed that encompasses the seasonal pond and wetland region.

iii. Identify rare and endangered species on-site. Describe the impact(s) and measures to mitigate the impact(s), or submit a statement explaining why no impact is anticipated, providing documentation to support that statement;

An "Animal Species of Concern" report was generated for the "Blue Grass Ridge" Quadrangle region (includes the area of the project site) from the Montana National Heritage website (mtnhp.org/SpeciesOfConcern/). A copy of this report is located in Appendix 28. This report lists bats, weasels, herons, bitterns, gulls, jays, crows, magpies, grebes, true toads, trout and other species as being "species of concern" for the region. The habitats listed for these species includes riparian, forest, mixed conifer forests, riparian forest, wetlands, floodplain pools, mountain streams, rivers, and lakes.

The project site is generally open grassland with a few trees. Many of the habitats listed for the species of concern for this region are not included on the project site (forest, riparian, rivers, streams, lakes). There is one wetland on the property, as discussed earlier in this report. A no build zone is proposed for this wetland area.

Montana, Fish, Wildlife and Parks was contacted regarding the subdivision. They replied with a letter stating that they had no comment on the subdivision. A copy of their letter is in Appendix 22.

iv. Describe any probable impacts and proposed measures to protect or enhance wildlife habitat or to minimize degradation (i.e. keeping buildings and roads back from shorelines; setting aside marshland as undeveloped open space);

Anticipated impacts to wildlife habit are minimal. There is no proposed construction of roads or utilities associated with the subdivision. The church will be developed on a lot that only has grasslands and no known critical wildlife habitats. A no build zone is proposed that encompasses the seasonal pond and wetland region in the Northeast corner of the property.

v. It is recommended that the subdivider discuss the impact of the proposed development on fish and wildlife with the Department of Fish, Wildlife and Parks (FWP) and incorporate any recommendations from the agency to mitigate wildlife impacts.

Montana, Fish, Wildlife and Parks was contacted regarding the subdivision. They replied with a letter stating that they had no comment on the subdivision. A copy of their letter is in Appendix 22.

f) Wildlife Habitat:

i. Proposed subdivisions that are contiguous to urbanized areas are presumed to

have a minimal impact on wildlife habitat;

Not applicable

ii. Proposed subdivisions in locations with riparian areas, wetlands, rivers, streams, lakes, or other natural surface waters are presumed to have an impact on wildlife habitat. Describe the impact(s) and measures to mitigate the impact(s), or submit a statement explaining why no impact is anticipated, providing documentation to support that statement;

Anticipated impacts to wildlife habit are minimal. There is no proposed construction of roads or utilities associated with the subdivision. The church will be developed on a lot that only has only grasslands and no known critical wildlife habitats. A no build zone is proposed that encompasses the seasonal pond and wetland region in the Northeast corner of the property.

iii. Proposed subdivisions in an area with rare or endangered species, as identified by state or federal agencies, are presumed to have an impact on the habitat of those species. Describe the impact(s) and measures to mitigate the impact(s), or submit a statement explaining why no impact is anticipated, providing documentation to support that statement;

An "Animal Species of Concern" report was generated for the "Blue Grass Ridge" Quadrangle region (includes the area of the project site) from the Montana National Heritage website (mtnhp.org/SpeciesOfConcern/). A copy of this report is located in Appendix 28. This report lists bats, weasels, herons, bitterns, gulls, jays, crows, magpies, grebes, true toads, trout and other species as being "species of concern" for the region. The habitats listed for these species includes riparian, forest, mixed conifer forests, riparian forest, wetlands, floodplain pools, mountain streams, rivers, and lakes.

The project site is generally open grassland with a few trees. Many of the habitats listed for the species of concern for this region are not included on the project site (forest, riparian, rivers, streams, lakes). There is one wetland on the property, as discussed earlier in this report. A no build zone is proposed for this wetland area.

Montana, Fish, Wildlife and Parks was contacted regarding the subdivision. They replied with a letter stating that they had no comment on the subdivision. A copy of their letter is in Appendix 22.

iv. Proposed subdivisions on and or adjacent to land identified by state or federal agencies as critical habitat are presumed to have an impact on wildlife habitat. Describe the impact(s) and measures to mitigate the impact(s), or submit a statement explaining why no impact is anticipated, providing documentation to support that statement.

Montana, Fish, Wildlife and Parks was contacted regarding the subdivision.

They replied with a letter stating that they had no comment on the subdivision. A copy of their letter is in Appendix 22. There are no known rare or endangered species on the site. A no build zone is proposed that encompasses the wetland on the site.

g) Agriculture and Timber Production:

i. On a sketch map locate the acreage, type and agricultural classifications of soils;

A United States Department of Agriculture Natural Resources Conservation Service Custom Soil Resources Report is Appendix 19. This report includes a soils map, soils types, classifications and acreages.

ii. Identify and explain the history of any agricultural production of the by crop type and yield;

Historical Google Earth imagery is located in Appendix 20. It shows that there has been hay production on the subject property in the past. According Father Daniel Kirk, current resident on the property, there is still hay production on the land.

iii. Describe the historical and current agricultural uses which occur adjacent to the proposed subdivision and explain any probable impacts and measures which will be taken to avoid or limit development conflicts with adjacent agricultural uses;

Historical Google Earth imagery is located in Appendix 20. It indicates that there has been hay production on the land West of the subdivision. The land to the North, East and South of the subdivision does not appear to be in production. Lot 1 of the proposed subdivision borders the land to the West that has had historic hay production, Lot 1 is already developed with a residence. The proposed church lot, Lot 2, is in the Southeast corner of the property and is not located near any adjoining agricultural production. Hay production on the church lot will cease to continue when the lot is developed. Lot 1 of the subdivision will still be used for hay production.

iv. If timbered, identify and describe any timber management recommendations which may have been suggested or implemented by a professional forester.

The land is not timbered. A few trees are located on the land, as shown on the preliminary plat.

h) Agricultural Water User Facilities:

i. On a sketch map or aerial photo locate the location of any agricultural water user facility, including but not limited to agricultural water works, wells, canals, irrigation ditches and pump houses on-site or adjacent to the proposed

subdivision;

Historical Google Earth imagery is located in Appendix 20 and a Water Resource Survey Map published by the State Engineers Office in June of 1965 is located in Appendix 21. Both of these sources indicate that there are no agricultural water user facilities located on the land or in close proximity to the land.

ii. Describe any agricultural water user facility on the site or in proximity that might be affected and explain any probable impact(s) and measures which will be taken to avoid or mitigate probable impacts;

Historical Google Earth imagery is located in Appendix 20 and a Water Resource Survey Map published by the State Engineers Office in June of 1965 is located in Appendix 21. Both of these sources indicate that there are no agricultural water user facilities located on the land or in close proximity to the land. Therefore, there are no anticipated impacts to agricultural water user facilities.

iii. It is recommended that the subdivider discuss any impact of the proposed development on agricultural water users facilities with the irrigation company or organization controlling the facility and incorporate any recommendations from the agency to mitigate agricultural water users impacts.

Historical Google Earth imagery is located in Appendix 20 and a Water Resource Survey Map published by the State Engineers Office in June of 1965 is located in Appendix 21. Both of these sources indicate that there are no agricultural water user facilities located on the land or in close proximity to the land. Therefore, there are no anticipated impacts to agricultural water user facilities.

i) Historical Features:

i. Describe and locate on a plat overlay or sketch map any known or possible historic, paleontological, archeological or cultural sites, structures, or objects which may be affected by the proposed subdivision;

There are no known historic, paleontological, archeological or cultural sites, structures, or objects on the site. The State Historic Preservation Office was contacted regarding the site. They conducted a cultural resource file search and determined that there have been no previously recorded sites on the project. A copy of the letter from the Montana Historical Society is located in Appendix 22.

ii. Describe any plans to protect such sites or properties;

N/A

iii. Describe the impact of the proposed subdivision on any historic features, and the need for inventory, study and/or preservation and consultation with the State Historic Preservation Office (SHPO).

There are no known historic, paleontological, archaeological or cultural sites, structures, or objects on the site. The State Historic Preservation Office was contacted regarding the site. The conducted a cultural resource file search and determined that there have been no previously recorded sites on the project. A copy of the letter from the Montana Historical Society is located in Appendix 22.

j) Visual Impact:

i. Describe any efforts to visually blend development activities with the existing environment.

Josh Hick of Hicks Woodworking, the designer/builder for the church lot, provided the following statement regarding the design of the church lot:

"The placement of the structures and the building materials used will complement the surrounding landscape. We are using a layered approach in the landscaping, setting the building back from the road and establishing gardens between the road and the church buildings. Specimen trees and shrubs will be used throughout.

We are also applying that same layered approach to the building design, with frequent changes in wall lines and a variety of roof planes. The structures will be timber framed in the traditional European style, and we will be using timbers sourced from a local sawmill. The finishes inside and out will be natural materials such as lime plaster, hand planed wood, rough sawn cedar shingles and limestone. These finishes will be natural in color and surface texture."

k) Air Quality:

i. Describe any anticipated impact to air quality caused from dust or other air pollutants, including dust created from roads, and any means to mitigate the impact to air quality.

There is no proposed construction of roads or utilities as a part of the subdivision process. The development of the church lot will include buildings, driveways, septic system, water system and onsite extension of power to buildings. A Dust Control Plan is located in Section E of this application that discusses mitigation of dust during development of the church lot.

l) Area Hazards:

i. Describe and locate on a plat overlay or sketch map any hazardous concerns or

circumstances associated with the proposed subdivision site, including, but not limited to:

(a) Any part of the proposed subdivision that is located within the Wildland Urban Interface priority area. If located in the Wildiand Urban Interface or high fire hazard area identified by a local fire district or fire protection authority describe probable impact(s) and measures to mitigate the impact(s), or submit a statement explaining why no impact is anticipated, providing documentation to support the statement;

The Flathead County GIS Mapper indicates that the proposed subdivision is not located within the Wildland Urban Interface, that it is not within a fire distrcit priority area, and that it is located within a county wide priority rating of medium high. Maps are located in Appendix 29 showing fire priority areas in the region surrounding the project.

(b) Any potential hazardous materials contained on site, including high pressure gas lines, high voltage transmission lines, super fund sites, abandoned landfills, mines or sewer treatment plants, etc. In some cases an Environmental Site Assessment may be required;

None.

(c) Describe measures to mitigate any adverse impacts associated with area hazards.

N/A

Section 2 - Community Impact Report

a) Water Supply:

i. Describe the proposed water system and how water will be provided for household use and fire protection and the number of gallons needed to meet the needs of the anticipated final population;

Appendix 8 includes a description of the proposed public water supply system and design criteria for the church lot. The residential lot has already been developed and is served by its own well.

ii. Indicate whether the plans for water supply meet state standards for quality, quantity and construction criteria.

Appendix 8 includes a description of the proposed public water supply system and design criteria for the church lot. Well logs from local wells are included in Appendix 10. The flow rate for the existing well on the site is 20 gallons per minute. A water quality test from a local well is included in Appendix 11.

A hydro-geologic report by Northern Rockies Engineering is included in in Appendix 8. This report shows that numerous wells in the region produce 20 gallons per minute or more. However, the report also shows that there are some wells that produce 10 gallons per minute or less.

The proposed public well and its design have to be approved by the Montana Department of Environmental Quality (MDEQ) prior to being drilled. Once the well is drilled, it will be pumped tested according to state standards. The pump test results will be used to finalize the design of the system and be included in the report to MDEQ.

iii. If the subdivider proposes to connect to an existing water system:

(a) Identify and describe that system;

The subdivision will not be connected to an existing water system.

(b) Provide written evidence that permission to connect to that system has been obtained;

N/A

(c) State the approximate distance to the nearest main or connection point;

N/A

(d) State the cost of extending or improving the existing water system to service the proposed development;

N/A

(e) Show that the existing water system is adequate to serve the proposed subdivision.

N/A

iv. If a public water system is to be installed, discuss:

(a) Who is to install that system and when it will be completed;

Saint Herman's Orthodox Church will be developing a public water system to supply water for the church lot. The water source for the system will be ground water. Saint Herman's Orthodox Church will make it's initial submittal to MDEQ this spring to obtain permission to drill the public well. Once this approval is obtained, the public well will be drilled and pump tested. Following the pump test, the water system design will be finalized and submitted to MDEQ. It is anticipated that MDEQ approval for the water system will be obtained by the end of 2019. The church plans to install the water system within 2 years of obtaining MDEQ approval. The

proposed water system is shown on the preliminary plat.

(b) Who will administer and maintain the system at the beginning of subdivision development and when subdivision is completed;

Saint Herman's Orthodox Church will install and maintain the water system.

(c) Provision of evidence that the water supply is adequate in quantity, quality, and dependability (75-6-101 MCA).

Appendix 8 includes a description of the proposed public water supply system and design criteria for the church lot. Well logs from local wells are included in Appendix 10. The flow rate for the existing well on the site is 20 gallons per minute. A water quality test from a local well is included in Appendix 11.

A hydro-geologic report by Northern Rockies Engineering is included in in Appendix 8. This report shows that numerous wells in the region produce 20 gallons per minute or more. However, the report also shows that there are some wells that produce 10 gallons per minute or less.

The proposed public well and its design have to be approved by the Montana Department of Environmental Quality (MDEQ) prior to being drilled. Once the well is drilled, it will be pumped tested according to state standards. The pump test results will be used to finalize the design of the system and be included in the report to MDEQ.

(d) If individual water systems are to be provided, describe the adequacy of supply of the ground water for individual wells or cisterns and how this was determined.

Appendix 8 includes a description of the proposed public water supply system and design criteria for the church lot. Well logs from local wells are included in Appendix 10. The flow rate for the existing well on the site is 20 gallons per minute. A water quality test from a local well is included in Appendix 11.

A hydro-geologic report by Northern Rockies Engineering is included in in Appendix 8. This report shows that numerous wells in the region produce 20 gallons per minute or more. However, the report also shows that there are some wells that produce 10 gallons per minute or less.

The proposed public well and its design have to be approved by the Montana Department of Environmental Quality (MDEQ) prior to being drilled. Once the well is drilled, it will be pumped tested according to state standards. The pump test results will be used to finalize the design of the system and be included in the report to MDEQ.

b) Sewage Disposal:

i. Describe the proposed method of sewage disposal and system;

The existing residence is served by a septic tank and drainfield. A copy of the septic permit for the existing residence is located in Appendix 9

It is proposed that the church lot will be served by a new public sanitary sewer system comprised of septic tanks and a pressure dosed drainfield. The proposed sanitary sewer system is shown on the preliminary plat.

ii. Indicate the number of gallons of effluent per day which will be generated by the proposed subdivision at its full occupancy, whether the proposed method of sewage disposal is sufficient to meet the anticipated final needs of the subdivision and whether it meets state standards;

As shown on the preliminary plat, the residential lot is already developed and served by a permitted septic tank drainfield.

The wastewater design flow for the church lot, at full build out, will be 405 gallons per day. The system septic tanks and dose tanks will be designed to hold larger weekend flows and dose the drainfield in smaller amounts over the course of a the week. The proposed sanitary system will be able to handle these flows.

Appendix 8 includes calculations of wastewater flows at full build out for the church lot. The proposed sanitary sewer system is shown on the preliminary plat. Appendix 8 shows design calculations for the proposed septic system. Appendix 12 has a non-degradtaion analysis that shows that the proposed septic system will meet state standards.

iii. If the development will be connected to an existing public sewer system, include:

(a) A description of that system and approximate distance from the nearest main or connection point to the proposed subdivision;

The subdivision will not be connected to an existing wastewater treatment system.

(b) Written evidence that permission to connect to that system has been obtained.

N/A

iv. If a new public sewage disposal system, as defined under 75-6-102 MCA, is to be installed, discuss:

(a) When the system will be completed, and how it will be financed;

Saint Herman's Orthodox Church will be developing a public sanitary

sewer system to serve the church lot. The proposed public sanitary sewer system will be designed this spring following a site evaluation. It is anticipated that MDEQ approval for the sanitary sewer system will be obtained by the end of 2019. The church plans to install the sanitary sewer system within 2 years of obtaining MDEQ approval. Saint Herman's Orthodox Church will finance the installation of the sanitary sewer system.

(b) Who is to administer and maintain the proposed system at the beginning of subdivision development and when development is completed?

Saint Herman's Orthodox Church will install and maintain the sanitary sewer system.

c) Storm Water Drainage:

i. Describe the proposed methods of storm water drainage for roads and other anticipated impervious surfaces, including storm water calculations;

There are no proposed roads for the subdivision. The development of the church lot will include driveways, a parking lot and buildings. Proposed storm water ponds and culverts for the church lot are shown on the preliminary plat. Appendix 23 includes a storm water report and calculations.

ii. Describe the proposed methods of storm water drainage for other areas of the subdivision, including storm water calculations;

There are no proposed roads for the subdivision. The development of the church lot will include driveways, a parking lot and buildings. Proposed storm water ponds and culverts for the church lot are shown on the preliminary plat. Appendix 23 includes a storm water report and calculations.

iii. Identify the mechanism and who is responsible for the maintenance of the storm water drainage system.

Culverts will be required for the driveway approaches to Morning View Drive as a part of the approach permit submitted to Flathead County Road and Bridge Department. Saint Herman Orthodox Church will be responsible for maintaining storm water ponds and culverts on their property.

d) Solid Waste Disposal:

i. Describe the proposed system of solid waste collection and disposal for the subdivision including:

(a) Evidence that existing systems for collection and facilities for disposal are available and can handle the anticipated additional volume;

Evergreen Disposal currently serves the existing residence on the property. They have provided a "will serve" letter for the project. A copy of their letter is included in Appendix 22.

(b) A description of the proposed alternative where no existing system is available.

N/A

e) Roads:

i. Describe any proposed new public or private access roads or substantial improvements of existing public or private access roads;

There are no proposed roads or road improvements for this project.

ii. Discuss whether any of the individual lots or tracts have access directly to arterial or collector roads; and if so, the reason access was not provided by means of a road within the subdivision;

Lot 1 of the subdivision is accessed from North Hill Road. Lot 2 is accessed from Morning View Drive. Both North Hill Road and Morning View Drive are considered local roads by the Flathead County GIS mapping website. Appendix 25 has an exhibit showing screen shot from the Flathead County GIS Mapper of the road classifications in the region.

iii. Explain any proposed closure or modification of existing roads.

No road closures or modifications are proposed.

iv. Identify existing primary road Average Vehicle Traffic and subdivision daily vehicle traffic assigned to that primary road.

The most current Flathead County traffic count data is from 2013. The average daily traffic for Morning View Drive, East of North Hill Road is 254 trips. Appendix 30 contains a copy of the 2013 Flathead County traffic count data.

v. Describe provisions considered for dust control on roads;

A dust control plan is located in Appendix 5.

vi. Indicate who will pay the cost of installing and maintaining dedicated and/or private roadways;

There are no proposed roads for this project.

vii. Discuss how much daily traffic will be generated on existing local and neighborhood roads and main arterial, when the subdivision is fully developed;

A traffic analysis is located in Appendix 24.

viii. Indicate the capacity of existing and proposed roads to safely handle any increased traffic. Describe any anticipated increased maintenance that will be necessary due to increased traffic and who will pay the cost of maintenance;

Morning View Drive and North Hill Road are declared county roads. The existing residence on Lot 1 is accessed from North Hill Road (gravel). The church lot is located on Lot 2 and is accessed via Morning View Drive (paved). Based on the traffic analysis in Appendix 24, no Traffic Impact Study is required for this project per Flathead County Subdivision Regulations Chapter 4.7.17(h). There is no requirement for existing road improvements or paving to existing roads based on Flathead County Subdivision Regulations Chapter 4.7.17(g). Based on the amount of traffic the subdivision will add to the road system, there is no anticipated increased maintenance to existing roads.

ix. Explain whether year round access by conventional automobile will be available over legal rights of way to the subdivision and to all lots and common facilities within the subdivision.

The subdivision is accessed by North Hill Road and Morning View Drive. Both roads are county roads that provide year round access to the site.

f) Utilities:

i. Include a description of

(a) The method of furnishing electric, natural gas or telephone service, where provided;

As shown on the preliminary plat, underground phone lines exist along the western border of the subdivision. Overhead power lines exist along the Southern and Western border of the subdivision as well as in the Northwest corner of the property. Propane tanks will be used for gas. There are no planned utility extensions to complete the subdivision. A letter from Flathead Electric Cooperative is located in Appendix 22. This letter states that they currently provide electricity to the existing residence and that they will be able to serve the church lot.

(b) The extent to which these utilities will be placed underground;

The electrical service line to the existing house comes from an electrical drop on a power pole. The service line is underground. The service for the church lot will be similar. There will be a pole drop

from a power pole and an underground service line to the buildings on the lot.

(c) Estimated completion of each utility installation.

No utility extensions are planned for the subdivision process. The church will extend an electrical service line into to the lot when the lot is developed. This is expected over the next few years.

g) Emergency Services:

i. Describe the emergency services available to the subdivision such as:

(a) Is the proposed subdivision in an urban or rural fire district? If not, will one be formed or extended? In absence of a fire district, what fire protection procedures are planned?;

The proposed subdivision is located within the Smith Valley Fire District.

(b) Police protection;

The subdivision is under the jurisdiction of the Flathead County Sheriff

(c) Ambulance service/Medical services;

Ambulance Service is provided by Smith Valley Fire Department, as stated in their letter in Appendix 22. The Kalispell Regional Health Center is located approximately 6 miles East of the site.

(d) Give the estimated response time of the above services;

A letter from the Flathead County Sheriff is in Appendix 22. They note that it is hard for them to predict response times to a specific location.

A letter from Smith Valley Fire District in Appendix 22 indicates that response times from the main fire station to the site is 5-15 minutes.

Google Maps indicates that it is a 12 minute drive to the Kalispell Regional Health Care Center from the Site.

(e) Can the needs of the proposed subdivision for each of the above services be met by present personnel and facilities.

The letter from the Flathead County Sheriff's Office and the letter from Smith Valley Fire Department, located in Appendix 22, do not indicate that additional staff will be needed as a result of the subdivision.

h) Schools:

i. Identify the School Districts and describe the available educational facilities which would service this subdivision;

The subdivision is located in Smith Valley School District 89 and the Flathead High School District.

ii. Estimate the number of school children that will be generated from the proposed subdivision;

There will be no school children generated from this subdivision. The new lot created for this project is for a church. No residences will be added from this subdivision.

iii. The subdivider shall discuss the impact of the proposed development on the provision of educational services with the administrator(s) of the appropriate school system(s). The subdivider shall provide a written statement outlining whether the increased enrollment can be accommodated by the present personnel and facilities and by the existing school bus system, any recommendations of the administrator(s), and any mitigation planned to overcome any adverse impacts of the proposed development on the provision of educational services.

There will be no school children generated from this subdivision. The new lot created for this project is for a church. No residences will be added from this subdivision. There are no anticipated impacts on schools.

i) Land Use:

i. Describe comprehensive planning and/or land use regulations covering the proposed subdivision or adjacent land and if located near the jurisdictional area of an incorporated city or town, whether annexation is propose;

The project is not within a zoning district, master plan area or neighborhood plan area. There is no annexation proposed with the subdivision.

ii. Describe how the subdivision will affect access to any public lands. Where public lands are adjacent to or near the proposed development, describe present and anticipated uses for those lands; (e.g., grazing, logging, recreation, etc.);

There are no public lands adjacent to the subdivision.

iii. Describe the effect of the subdivision on adjacent land use;

The subdivision will have minimal effect on adjacent land uses. Adjacent land uses are residential and light agricultural. The subdivision will add

minimal traffic to the local roads (See Appendix 24), with most of the traffic occurring on Sunday morning.

iv. Describe any health or safety hazards on or near the subdivision, such as mining activity or potential subsidence, high pressure gas lines, dilapidated structures or high voltage power lines. Any such conditions should be accurately described and their origin and location identified. List any provisions that will be made to mitigate these hazards.

There are no significant health or safety hazards on or near the subdivision.

j) Housing:

i. Indicate the proposed use(s) and number of lots or spaces in each:

(a) For residential indicate the type of dwelling unit;

Lot 1 will be used for a single family residence. This lot has already been developed with a single family residence.

(b) For all other uses the type and intensity of use (e.g. industrial, commercial, etc.).

Lot 2 will be developed for Saint Herman's Orthodox Christian Church.

k) Parks and Recreation Facilities:

i. Describe park and recreation facilities to be provided within the proposed subdivision and other recreational facilities which will serve the subdivision.

There are no proposed parks or recreational facilities proposed for this subdivision. According to Flathead County Subdivision Regulations Section 4.7.24 (a)(i), parkland dedication is not required for this subdivision as all the lots are greater than 5 acres in size.

l) Parks and Recreation Facilities:

i. Describe any probable impacts and any measures to mitigate the impacts, or submit a statement explaining why no impact is anticipated, providing documentation to support that statement that might affect public health and safety that aren't specifically addressed in other sub-section of the environmental assessment;

There are no other impacts anticipated other than those already covered in the sections above.